# REMARKS

Claims 1-24 are now pending in the application. The Examiner is respectfully requested to reconsider and withdraw the rejections in view of the amendments and remarks contained herein. Applicant's representatives thank the Examiner for the courtesies extended during the telephone interview of October 19, 2006. The previous rejections and the Krasner et al. (U.S. 6,665,541) reference were discussed in light of the amendment to claim 1. The Examiner acknowledged that Krasner et al. does not teach or suggest the recited positioning system and that the rejections under 35 U.S.C. § 112 would be withdrawn.

## **CLAIM OBJECTIONS**

Claims 17 and 22 stand objected to for certain informalities. Applicant has amended claims 17 and 22 to clarify the wording of such claims according to the Examiner's suggestions.

## REJECTION UNDER 35 U.S.C. § 112

Claims 1, 13, and 14 stand rejected under 35 U.S.C. § 112, first paragraph, as failing to comply with the written description and enablement requirements and as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. See paragraphs 8 and 9 of Office Action dated 7/21/06. These rejections are respectfully traversed.

Applicant maintains that claims 1, 13, and 14, which as previously presented recite that the positioning terminal uses the time TT as a reference to receive the

signals from the first signal sources for positioning, are enabled and apprise a person of ordinary skill in the art of their scope and that the Specification contains a sufficient written description of the claims as previously presented. However, to expedite prosecution, Applicant has amended claim 1 to recite that the positioning terminal uses the time TT to limit a search for the signals from the first signal sources, and uses the signals from the first signal sources for determining the position of the positioning terminal. Support for the amendment is found in paragraphs [0031] and [0038] of the Specification. Similar amendments have been made to claims 13 and 14. Therefore, reconsideration and withdrawal of the rejections are respectfully requested.

Claims 1-2 and 13-14 are rejected under 35 U.S.C. § 112, second paragraph, as being in indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention. See paragraph 10 of Office Action dated 7/21/06. This rejection is respectfully traversed.

The Examiner argues that that the preamble of the claims are directed to a positioning system for determining a position of a positioning terminal but that the body of the claims do not include determining a position of a positioning terminal. Applicant respectfully notes that claim 1, for example, as previously presented recited "wherein the positioning terminal uses the time TT as a reference to receive the signals from the first signal sources for positioning. However, to expedite prosecution, Applicant has amended claim 1 to recite that the positioning terminal uses the time TT to limit a search for the signals from the first signal sources, and uses the signals from the first signal sources for determining the position of the positioning terminal. Similar amendments

have been made to claims 2, 13 and 14. Therefore, reconsideration and withdrawal of the rejections are respectfully requested.

# REJECTION UNDER 35 U.S.C. § 102

Claims 1-6, 8-11, 13-16, and 18-21 and 23 stand rejected under 35 U.S.C. § 102(e) and 102(a) as being anticipated by Krasner et al. (U.S. Pat. No. 6,665,541). This rejection is respectfully traversed.

Claim 1 recites a positioning system for determining a position of a positioning terminal. The system includes a plurality of first signal sources each emitting a respective first signal, and one or more second signal sources each emitting a respective second signal. The first signals are synchronous with a reference time and the second signals are non-synchronous with the first signals. Based on a signal propagation time and signal propagation speed of the first signals, the system determines a distance from the positioning terminal. The positioning system comprises a measurement device, a control device. The measurement device receives the first signals from the first signal sources to determine a position P of the measurement device and a time of measurement when the measurement device receives the first signals. Based on the time of measurement, the measurement device measures a receiving time (TR), based on the reference time, of a predetermined event of the second signals. The control device determines a signal propagation time (t) between the measurement device and one of the second signal sources by calculating a relative distance [P-Q] between the measurement device and the one second signal source based on the position P measured by the measurement device and a position Q of the

one second signal source and by dividing the resulting distance by the signal propagation speed. The control device also determines a time (TT), based on the reference time, at which the one second signal source originates the predetermined event by solving TR-t. The positioning terminal has a receiving device for receiving the signals from the first and second signal sources. The communication device communicates between the control device and the positioning terminal. The positioning terminal uses the time TT to limit a search for the signals from the first signal sources, and uses the signals from the first signal sources for determining the position of the positioning terminal.

Krasner et al. fails to teach or suggest the positioning system recited by claim 1. Krasner et al. describes a method whereby the current time of a cellular basestation is updated from the GPS time associated with a transmitted marker which has been time tagged by a mobile unit. Krasner et al., Col. 8, Lines 28-31. In Krasner et al., the updating method is used to synchronize multiple basestation clocks. Krasner et al., Col. 7, Lines 4-8. Krasner et al. is silent, however, as to the subsequent use of the time tagged transmitted marker by a positioning terminal to limit a search for signals from the GPS signals for positioning. With specific reference to the limitations recited by claim 1, Krasner is silent as to a positioning terminal that uses a time TT (TT being a time at which a second signal source originates a predetermined event) to limit a search for signals from first signal sources and that uses the signals from the first signal sources for determining a position of the positioning terminal.

For these reasons, Krasner et al. does not teach each and every element of claim 1. Therefore, claim 1 defines over the Krasner et al. reference and

reconsideration and withdrawal of the rejection are respectfully requested. Further, Applicant notes that similar limitations are recited by claims 2, 13, and 14. For at least the above reasons, claims 2, 13, and 14 also define over the Krasner et al. reference and reconsideration and withdrawal of the rejections are respectfully requested.

With regard to claims 3-6, 8-11, 15-16, 18-21, and 23, Applicant notes that each either directly or indirectly depends from claims 1, 2, 13 or 14, which define over the Krasner et al. reference as discussed in detail above. Therefore, claims 3-6, 8-11, 15-16, 18-21, and 23 also define over the Krasner et al. reference and reconsideration and withdrawal of the rejections are respectfully requested.

# REJECTION UNDER 35 U.S.C. § 103

Claims 7, 12 and 24 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Krasner et al. in view of Vannucci (U.S. Pub. No. 2004/0189515). This rejection is respectfully traversed.

As described above, claims 7, 12, and 24 each depend directly or indirectly from claims 1 and 13 which define over the Krasner et al. reference as discussed in detail above. Vannucci likewise fails to teach or suggest a positioning terminal that uses a time TT (TT being a time at which a second signal source originates a predetermined event) to limit a search for signals from first signal sources and that uses the signals from the first signal sources for determining a position of the positioning terminal, as recited by claim 1. Similar limitations are recited by claim 13. For at least the above reasons, claims 7, 12, and 24 also define over the prior art cited and reconsideration and withdrawal of the rejections are respectfully requested.

**ALLOWABLE SUBJECT MATTER** 

The Examiner states that claims 17 and 22 would be allowable if amended to

overcome the objections and rejections under 35 U.S.C. 112 and to include all of the

limitations of the base claim and any intervening claims. Applicant thanks the Examiner

for recognizing the allowable subject-matter of claims 17 and 22, Applicant presently

refrains from rewriting claims 17 and 22 in independent form in view of the remarks set

forth above.

CONCLUSION

It is believed that all of the stated grounds of rejection have been properly

traversed, accommodated, or rendered moot. Applicant therefore respectfully requests

that the Examiner reconsider and withdraw all presently outstanding rejections. It is

believed that a full and complete response has been made to the outstanding Office

Action and the present application is in condition for allowance. Thus, prompt and

favorable consideration of this amendment is respectfully requested. If the Examiner

believes that personal communication will expedite prosecution of this application, the

Examiner is invited to telephone the undersigned at (248) 641-1600.

Respectfully submitted,

Dated: Oct 20, 2006

G. Gregory Schivle

Rég. No. 27

Bryant E/Wade #eg. No. 40,34

HARNESS, DICKEY & PIERCE, P.L.C. P.O. Box 828 Bloomfield Hills, Michigan 48303 (248) 641-1600

GGS/BEW/MPD